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Applicant : GEIST, Jon
Appl. No. : 10/081,963
Filed : 02/21/2002
Title : Method for TMAH etching of CMOS integrated circuits
Art Unit : 1765
Examiner : DuyVun Deo

Honorable Commissioner of Patents
Washington DC 20231

AMENDMENT A (corrected)

Sir:

In response to the Office Action of 2004 JULY 01, please amend the above identified application as follows:

In the Claims:

Cancel claims 1-9 and substitute new claims 10-16 as follows:

10. A method for preparing an etchant comprising a solution of tetramethylammonium hydroxide and water, wherein

- A liquid source of silicate ions is mixed with said solution, and
- An oxidizer is added to said etchant at a time later than 10 minutes following immersion of a sample comprised of silicon in said etchant.

11. The method of claim 10, wherein said oxidizer is ammonium peroxydisulfate.

12. The method of claim 10, wherein said oxidizer is obtained from a liquid source of oxidizer.

13. The method of claim 12, wherein said liquid source of oxidizer is a solution of ammonium peroxydisulfate in water.

14. The method of claim 10, wherein a quantity of tetramethylammonium hydroxide is added to said etchant at a time later than ten minutes following immersion of said sample in said etchant.

15. The method of claim 14, wherein said quantity of tetramethylammonium hydroxide is sufficient to maintain the pH of said etchant substantially above the threshold for silicate precipitation.

16. The method of claim 10, wherein said liquid source of dissolved silicate ions is a colloidal suspension of silicon dioxide.